What is claimed is:

| 1 | 1. A method of operating a service network connected to an |
|---|--|
| 2 | access network infrastructure shared with other service networks, comprising the |
| 3 | steps of sharing bandwidth allocated between the service networks. |

2. A method of operating a service network connected to an access network infrastructure shared with other service networks, comprising the steps of using hardware address bridging so that the service networks can manage layer three operations.